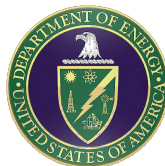


Detector R&D for an Electron Ion Collider

17th Advisory Committee Meeting
BNL, July 11-12, 2019

Thomas Ullrich (BNL/Yale)
July 11, 2019

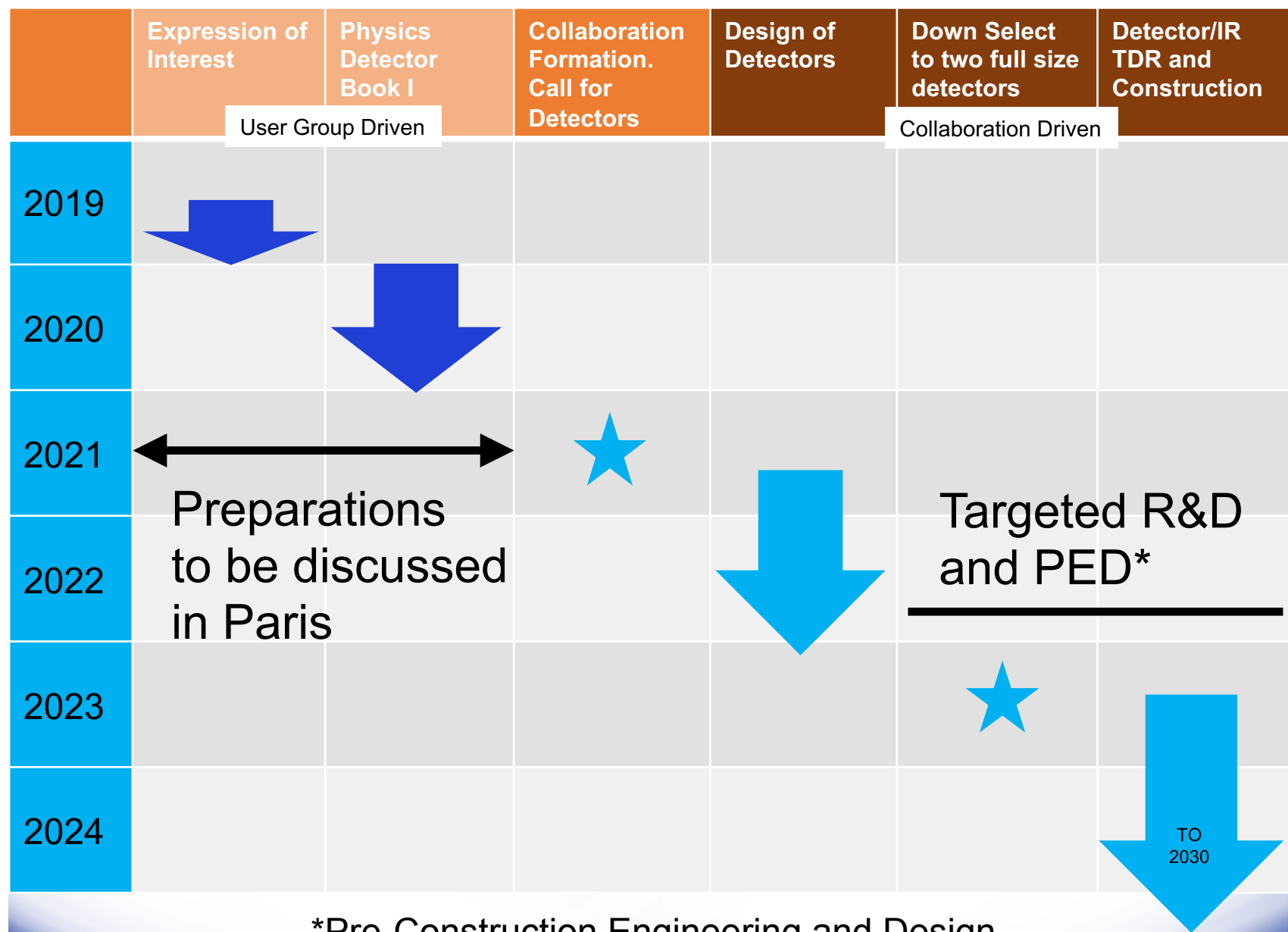


EIC Status

- **Things are moving fast after release of NAS review**
- May 2019: Both labs had to hand in detailed cost review
 - ▶ Committee to submit their report beginning of August
 - ▶ We suspect that the report will not be made public
- May 2019: Good showing at the European strategy meeting in Granada. 2 EIC submissions:
 - ▶ Synergies between a U.S.-based Electron-Ion Collider and the European research in Particle Physics
 - ▶ Electron Ion Collider Accelerator Science and Technology – Designs, R&D and Synergies with European research in Accelerators
- July 22-26: User Group Meeting in Paris
- September 2019: CD-0 expected
 - ▶ Mentioned in FY20 budget justification document by DoE

Implications

Source EIC User Group SC



FY2019 Funding Period & New Proposals

- 10 Projects are funded in FY19

Green = consortia

- ▶ eRD1 - Calorimeter consortium
- ▶ eRD6 - Tracking consortium
- ▶ eRD14 - PID consortium
- ▶ eRD16 - Fwd Silicon tracking
- ▶ eRD17 - Simulations (BEAGLE)
- ▶ eRD18 - Central Si tracking
- ▶ eRD20 - Software consortium
- ▶ eRD21 - Machine background studies
- ▶ eRD22 - GEM TRD
- ▶ eRD23 - Streaming Readout

FY20: 10 above + 3 new proposals. Total request ~\$1.8M

EIC R&D Advisory Committee

Standing Advisory Committee:

Marcel Demarteau* (ORNL)

Carl Haber (LBNL)

Peter Krizan (Ljubljana)

Ian Shipsey (Purdue)

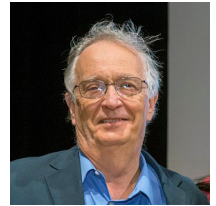
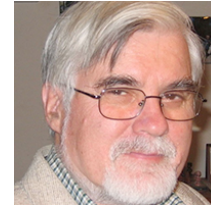
Rick Van Berg (UPenn)

Jerry Va'vra (SLAC)

Glenn Young (JLab)

Blair Ratcliff (SLAC)

*chair



Please use coffee breaks for informal discussion with committee members. Pls & speakers were invited to join working dinner tonight.

Unfortunately Ian, Peter, and Blair could not make it this time.

Agenda

- We will use agenda as posted (no need for plan B option)
- Agenda is very tight
 - ▶ Stay within your allocated time
 - ▶ 10 min discussion time is important
 - ▶ don't risk to be cut-off
- Pls/Contacts, please see me in the coffee breaks to discuss your projects budget balance

Thursday, July 11, 2019

08:00 Committee: Breakfast and Executive Session (Physics Department, bldg. 510, room 2-160)

Physics Department (bldg. 510), Large Seminar Room

	Title	Speaker (Time)	Slides
08:50	Welcome and Overview	Thomas Ullrich (10)	
09:00	eRD6: Progress Report - Tracking	Matt Posik (40+10)	
09:50	eRD22: Progress Report - GEM Based TRD	Yulia Furletova (20+10)	pdf
10:20	Coffee Break		
10:50	eRD20: Software/Analysis Consortium	Markus Diefenthaler (20+10)	
11:20	New Proposal: Generic Tracking Tool	José Repond (20+10)	
11:50	Lunch Break		
13:20	eRD14: Progress Report - PID Consortium	Pawel Nadel-Turonski (40+10)	
14:10	eRD1: Progress Report - Calorimeter Consortium	C. Woody, T. Horn, O. Tsai (45+10)	
15:05	Coffee Break		
15:35	eRD17: Progress Report - BeAGLE	Mark Baker (20+10)	
16:05	New Proposal^(a): Silicon Detectors for Roman Pots at EIC	Alessandro Tricoli (20+10)	
16:35	New Proposal^(b): Design of Integrated Sensors	José Repond (20+10)	
17:05	Executive Session (Physics Department, bldg. 510, room 2-160)		
19:00	Dinner and Discussions - Committee & PIs/Speakers^(c) (Berkner Hall)		

Friday, July 12, 2019

08:00 Committee: Breakfast and Executive Session (Physics Department, bldg. 510, room 2-160)

Physics Department (bldg. 510), Large Seminar Room

	Title	Speaker	Slides
9:00	eRD16: Forward/Backward Tracking with MAPS	Ernst Sichtermann (20+10)	
9:30	eRD18: Central Silicon Tracking	Laura Gonella (20+10)	
10:00	eRD23(d): Streaming Readout	Jan Bernauer (20+10)	
10:30	Coffee Break		
11:00	eRD21(e): EIC Background Studies	Charles Hyde (20+10)	
11:30	Committee Executive Session & Working Lunch (Physics Department, bldg. 510, room 2-160)		
~13:30	Close-Out (Physics Department, bldg. 510, room 2-160)		

Many Thanks To

- The **EIC R&D Committee** for their enthusiasm and hard work to make the program work
- **Liz Mogavero** for dealing with the contracts all year
- **Achim Franz** for A/V support
- **Alexander Kiselev** for helping me out this meeting
- **Rachel Nieves** for travel arrangements and housing for the committee, for all food & beverage arrangements, room bookings, dealing with guest registrations, and for keeping up with us
- **You** for the interest and engagement in the projects and their patience

Looking forward to a successful meeting